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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/922,065	08/01/2001	Wing Jong Mar	10010274-1	7570

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AGILENT TECHNOLOGIES, INC.
Legal Department, DL429
Intellectual Property Administration
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Loveland, CO 80537-0599

EXAMINER

WANG, TED M

ART UNIT	PAPER NUMBER
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2634

DATE MAILED: 01/10/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/922,065	Applicant(s) MAR ET AL.	
	Examiner Ted M Wang	Art Unit 2634	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 01 August 2001.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-30 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3,5,6,18,20,21, and 27 is/are rejected.
- 7) ☒ Claim(s) 2,4,7-17,19,22-26 and 28-30 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 01 August 2001 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>08/01/01, 05/20/02</u> | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Drawings

1. The drawings are objected to because
 - The drawing should label all the elements in the figures. For example, in Fig.1 element 10 should be labeled as "Filter"; and element 40 should be labeled as "Tuning Control frequency Scan"; etc.

A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Claim Objections

2. Claims 2, 13-17 and 23-26 are objected to because of the following informalities:
 - In claim 2 line 3, " \mathcal{L}_T " should be changed to -- \mathcal{L}_A --.
 - In claims 23 line 11, " f_m " has not been defined.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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4. Claims 1, 3, 5, 6, and 27 are rejected under 35 U.S.C. 102(b) as being anticipated by Roth (US 6,313,619).

- With regard claim 1, Roth discloses a method of compensating for phase noise added by a spectrum analyzer to measurements of phase noise of a signal under test (SUT) taken by the spectrum analyzer (Fig.1), the method comprising the step of:

applying a correction to a measured phase noise $\mathcal{L}(f_m)$ value for the SUT to determine an actual phase noise $\mathcal{L}_A(f_m)$ value for the SUT (Fig.1 element 26 and column 2 line 1 – column 3 line 45), wherein the correction comprises mathematically removing an added phase noise $\mathcal{L}_{SA}(f_m)$ value contributed by the spectrum analyzer from the measured phase noise $\mathcal{L}(f_m)$ value of the SUT (Fig.1 element 27 and column 2 line 1 – column 3 line 45).
- With regard claim 3, Roth further discloses the step of measuring phase noise $\mathcal{L}(f_m)$ values of the SUT at a plurality of offset frequencies f_m prior to performing the step of applying the correction (Fig.1 element 26 and column 2 line 1 – column 3 line 45).
- With regard claim 5, Roth further discloses the step of displaying the corrected actual phase noise $\mathcal{L}_A(f_m)$ data (column 2 line 1 – column 3 line 45).
- With regard claim 6, all limitation can further be taught in column 2 line 1 – column 3 line 45.

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- With regard claim 27, which is a system claim related to claim 1, all limitation is contained in claim 1. The explanation of all the limitation is already addressed in the above paragraph.

5. Claims 18, 20, and 21 are rejected under 35 U.S.C. 102(b) as being anticipated by Rhode & Schwarz software Help Menus for using phase noise measurement software (Figs. 1-3, including "Making a Phase Noise Measurement", see IDS filed on 5/20/2002).

- With regard claim 18, Rhode & Schwarz Help Menus for using phase noise measurement software, cited by the instant applicant, teaches a method of determining an actual phase noise of a signal under test (SUT) (Fig.3 lines 2-15), the method comprising the steps of:

measuring phase noise of a spectrum analyzer under reference conditions to obtain an added phase noise $\mathcal{L}(f_m)$ value (Fig.3 lines 2-15);

measuring phase noise of the SUT using the spectrum analyzer to obtain a measured phase-noise, $\mathcal{L}(f_m)$ value (Fig.3 lines 2-15);

and calculating an actual phase noise $\mathcal{L}_A(f_m)$ value of the SUT as a function of the measured phase noise $\mathcal{L}(f_m)$ of the SUT and the added phase noise $\mathcal{L}_{SA}(f_m)$ value (Fig.3 lines 2-15).
- With regard claim 20, which is a system claim related to claim 1, all limitation is contained in claim 1. The explanation of all the limitation is already addressed in the above paragraph.

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- With regard claim 21, which is a system claim related to claim 1, all limitation is contained in claim 1. The explanation of all the limitation is already addressed in the above paragraph.

Allowable Subject Matter

6. Claims 23-26 would be allowable if rewritten to overcome the objection(s) set forth in this Office action.
7. Claims 4, 7-12, 19, 22, and 28-30 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

8. References US 5,337,014 and Application Note 1EPAN 16E (Rohde & Schwarz Inc.) are cited because they are put pertinent to the phase noise measurement with spectrum analyzer. However, none of references teach detailed connection as recited in claim.
9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ted M Wang whose telephone number is (571) 272-3053. The examiner can normally be reached on 8:30 a.m. - 5:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stephen Chin can be reached on (571) 272-3056. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-0377.

Ted M Wang
Examiner
Art Unit 2634

Ted M. Wang

A handwritten signature in black ink, appearing to read "Shuwang Liu".

SHUWANG LIU
PRIMARY EXAMINER